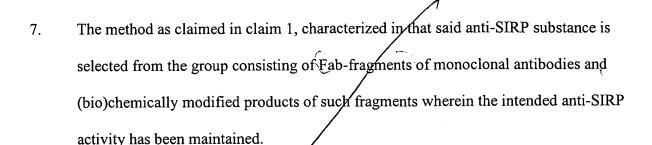


CLAIMS

- 1. A method for inhibiting cell functioning for use in anti-inflammatory and anti-tumor therapies in the body of a warm-blooded living being, which comprises administering to said being a drug comprising, in a quantity effective for said therapies, a substance that specifically recognizes the extracellular domain of SIRP (anti-SIRP substance) and that inhibits the functioning of pathologic myeloid cells.
- The method as claimed in claim 1, wherein said substance inhibits the functioning of macrophages by suppressing their activation by a factor of at least 10 as measured by each of the following macrophage activity tests: (i) the production of nitric oxide (NO), (ii) the production of reactive oxygen species, and (iii) the production of tumor necrosis factor alpha (TNF-α).
- 3. The method as claimed in claim 1, wherein said substance inhibits the functioning of pathologic myeloid cells by suppressing the division of macrophage tumor cell lines by a factor of at least 10 as measured by the macrophage division test.
- 4. The method as claimed in claim 1 for treating pathologies selected from inflammations caused by autoimmune diseases or by allergies, and myeloid leukemia.
- The method as claimed in claim 1, wherein said substance inhibits the functioning of macrophages by temporally suppressing their phagocytosis as measured by the macrophage phagocytosis test.
- 6. The method as claimed in claim 5 for improving the efficacy of gene-targeted therapies.

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- 8. The method as claimed in claim 7, wherein said anti-SIRP substance is a Fab-fragment of monoclonal antibody ED9 or ED17, or said modified product thereof.
- 9. (Use of a substance, that specifically recognizes the extracellular domain of SIRP (anti-SIRP substance) and that inhibits the functioning of pathologic myeloid cells, for the manufacture of a drug for inhibiting cell functioning for use in anti-inflammatory and anti-tumor therapies.
- 10. The use as claimed in claim 9, wherein the anti-SIRP substance is selected from the group consisting of Fab-fragments of monoclonal antibodies, preferably of ED9 or ED17, and (bio)chemically modified products of such fragments wherein the intended anti-SIRP activity has been maintained.
- 11. A drug comprising, in addition to a pharmaceutically acceptable carrier and, if desired, one or more pharmaceutically acceptable adjuvants, as the active substance an anti-SIRP substance that inhibits the functioning of pathologic myeloid cells.
- 12. A drug as claimed in claim 11, wherein the anti-SIRP substance is selected from the group consisting of Fab-fragments of monoclonal antibodies, preferably of ED9 or ED17, and (bio)chemically modified products of such fragments wherein the intended anti-SIRP activity has been maintained.

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- 13. An anti-SIRP substance that inhibits the functioning of pathologic myeloid cells, selected from the group consisting of Fab-fragments of monoclonal antibodies, preferably of ED9 or ED17, and (bio)chemically modified products of such fragments wherein the intended anti-SIRP activity has been maintained.
- 14. A method to detect a substance interacting with SIR and inhibiting the functioning of pathologic myeloid cells, said method comprising the steps of:
 - a) providing a cell line expressing SIRP on its membrane,
 - b) stimulating the production of pro-inflammatory cytokines,
 - c) contacting the substance of interest with the stimulated cell line, and
 - d) measuring the change in production of inflammatory mediators.

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